

**Commonwealth of Kentucky**  
**Natural Resources and Environmental Protection Cabinet**  
**Department for Environmental Protection**  
**Division for Air Quality**  
**803 Schenkel Lane**  
**Frankfort, Kentucky 40601**  
**(502) 573-3382**

## **AIR QUALITY PERMIT**

**Permittee Name:** Calvert City Power I, L.L.C.  
**Mailing Address:** 1400 Smith Street, Houston, Texas 77002

**Source Name:** Calvert City Power I, L.L.C.  
**Mailing Address:** 1400 Smith Street, Houston, Texas 77002

**Source Location:** Needmore Road, Calvert City, Kentucky 42029

**Permit Type:** Federally-Enforceable  
**Review Type:** PSD, NSR, Title V

**Permit Number:** V-99-037  
**Log Number:** G010  
**Application Complete date:** July 16, 1999

**KYEIS #:** 072-2600-0051  
**AFS Plant ID#:** 21-157-00051  
**SIC Code:** 4911

**Region:** Paducah-Cairo  
**County:** Marshall

**Issuance Date:**  
**Expiration Date:**

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**John E. Hornback, Director**  
**Division for Air Quality**

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## SECTION A - PERMIT AUTHORIZATION

Pursuant to a duly submitted application which was determined to be complete on July 16, 1999, the Kentucky Division for Air Quality hereby authorizes the construction and operation of the equipment described herein in accordance with the terms and conditions of this permit. This permit has been issued under the provisions of Kentucky Revised Statutes Chapter 224 and regulations promulgated pursuant thereto.

The permittee shall not construct, reconstruct, or modify any emission units without first having submitted a complete application and receiving a permit for the planned activity from the permitting authority, except as provided in this permit or in the Regulation 401 KAR 50:035, Permits.

Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by this Cabinet or any other federal, state, or local agency.

## **SECTION B -EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

**Emissions Unit: 01 (01) - Natural Gas-Fired Simple Cycle Combustion Turbine**

### **Description:**

Construction commenced: expected September 1999

1734 MMBTU/hr (ISO standard day conditions, LHV) rated heat input capacity, 181 MW rated capacity output

Westinghouse 501F gas-fired simple cycle combustion turbine equipped with water injection

### **Applicable Regulations:**

Regulation 401 KAR 60:330, Standards of performance for stationary gas turbines, incorporating by reference 40 CFR 60, Subpart GG, Standards of Performance for Stationary Gas Turbines, for emissions unit with a heat input at peak load equal to or greater than 10 MMBTU/hour for which construction commenced after October 3, 1977, and

Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality

### **1. Operating Limitations:**

1. The rated heat input capacity shall not exceed 1734 MMBTU/hour at ISO standard day conditions, in accordance with Regulation 401 KAR 51:017. The rated heat input capacity shall be calculated from the fuel usage, and corresponding fuel heating value characteristic of the fuel to be combusted corrected to ISO standard conditions based on manufacturer's curves or equations for correction.

2. The maximum annual hours of operation for the turbine shall not exceed 3500 hours. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

3. Natural gas shall be the sole fuel fired in the turbine. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

### **2. Emission Limitations: [See Section D for sourcewide emission limitations]**

a) The following table is a summary of the Best Available Control Technology (BACT) determination and is followed by applicable specific conditions. Values for nitrogen oxides and carbon monoxide are corrected to 15 % oxygen on a dry basis.

## SECTION B -EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS

### 2. Emission Limitations continued:

a) Continued

Fuel Specification	NO <sub>x</sub> (15 % O <sub>2</sub> )	CO (15 % O <sub>2</sub> )	SO <sub>2</sub>	PM/PM <sub>10</sub>	Technology
Natural gas	0.1 lb/MMBTU  (Equivalent to 25 ppmvd)	30 ppmvd (at rated capacity output) 90 ppmvd max (under other operating load conditions)	2.0 grains/ 100 SCF	18.1 lbs/hour	Water injection, Good combustion, Low sulfur fuel/clean fuel natural gas

b) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.332, and 401 KAR 51:017, nitrogen oxides emission level in the exhaust gas shall not exceed 0.1 lb/MMBTU based on 25 ppm by volume at 15 percent oxygen and on a dry basis, and based on a three-hour rolling average. The ppm level of nitrogen oxides (at ISO standard conditions) and lb/MMBTU shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

c) Pursuant to Regulation 401 KAR 51:017, the carbon monoxide emission level in the exhaust gas shall not exceed (i) at rated capacity output, a limit of 30 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period, or (ii) under other operating load conditions, a limit of 90 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period. During any three-hour period in which the unit is operated at both rated capacity output and less than rated capacity output, the carbon monoxide emission limit shall be based on the time-weighted average of 30 ppmvd and 90 ppmvd. The ppm level of carbon monoxide shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

d) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.333, and 401 KAR 51:017, the fuel sulfur content due to the firing of pipeline quality natural gas shall not exceed 2.0 grains sulfur/100 SCF gas.

e) Pursuant to Regulation 401 KAR 51:017, particulate emissions shall not exceed 18.1 pounds per hour.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **3. Testing Requirements:**

a) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335 (b), in conducting performance tests required by 40 CFR 60.8, the owner or operator shall use as test methods and procedures the test methods in Appendix A of Part 60 or other methods or procedures as specified in 40 CFR 60.335, except as provided for in 40 CFR 60.8(b).

b) The owner or operator shall determine compliance with the nitrogen oxides standard in accordance with 40 CFR 60.335(c)(1), (2), and (3) which includes use of Method 20 to determine the nitrogen oxides and oxygen concentrations.

c) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for nitrogen oxides. The initial nitrogen oxides performance test shall be performed in accordance with General Condition G(d)(5).

d) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial test for fuel sulfur content in accordance with General Condition G(d)(5).

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335(d), the owner or operator shall determine compliance with the sulfur content standard as follows: ASTM D 1072-80, D 3031-81, D 4084-82, or D 3246-81 shall be used for the sulfur content of gaseous fuels. The applicable ranges of some ASTM methods mentioned above are not adequate to measure the levels of sulfur in some fuel gases. Therefore, dilution of samples before analysis (with verification of the dilution ratio) may be used, subject to the approval of the Division.

f) To meet the requirements of 40 CFR 60.334(b), the owner or operator shall use the methods specified in 40 CFR 60.335(d) to determine the sulfur content of the fuel being burned. The analysis may be performed by the owner or operator, a service contractor retained by the owner or operator, the fuel vendor, or any other qualified agency.

g) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for carbon monoxide, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

h) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for particulate matter, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

i) See General Condition G(d)(6).

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **4. Specific Monitoring Requirements:**

- a) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), and 40 CFR 75, the permittee shall install, calibrate, maintain, and operate the nitrogen oxides Continuous Emissions Monitor (CEM). The nitrogen oxides CEM shall be used as the indicator of continuous compliance with the nitrogen oxides emission standard. Excluding the startup and shut down periods, if any 3-hour rolling average exceeds the nitrogen oxides emission limitation, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary control device/process/CEM repairs or take corrective action as soon as practicable.
- b) The nitrogen oxides CEM shall be used in lieu of the water to fuel monitoring system for reporting excess emissions in accordance with 40 CFR 60.334(c)(1). The calibration of the water to fuel monitoring device required in 40 CFR 60.335(c)(2) will be replaced by the 40 CFR 75 certification tests of the nitrogen oxides CEM. The CEM emission rates for nitrogen oxides shall be corrected to ISO conditions to demonstrate compliance with the nitrogen oxides standard established in Subsection 2.
- c) Additionally, a CEM system shall be installed, calibrated, maintained, and operated for measuring oxygen levels.
- d) The owner or operator shall comply with all of the monitoring requirements of 40 CFR 75.
- e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(a), the owner or operator using water injection to control nitrogen oxide emissions shall install and operate a continuous monitoring system to monitor and record the fuel consumption. This system shall be accurate to within plus or minus five (5) percent and shall be approved by the Division.
- f) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(b), the owner or operator of any stationary turbine shall monitor sulfur content of the fuel being fired in the turbine. The frequency of determination of these values shall be as specified in 40 CFR 60.334(b)(1) and (2). (Custom fuel monitoring schedule required)
- g) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), to meet the periodic monitoring requirement for carbon monoxide the permittee shall use a continuous emission monitor (CEM). Excluding the startup and shut down periods, if any 3-hour rolling average carbon monoxide value exceeds the standard, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary process or CEM repairs or take corrective action as soon as practicable.

**SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS****4. Specific Monitoring Requirements continued:**

h) Pursuant to 40 CFR 60.13(b), the continuous monitoring systems and monitoring devices shall be installed and operational prior to conducting the initial performance tests. Verification of operational status shall, as a minimum, include completion of the manufacturer's written requirements or recommendations for installation, operation, and calibration of the device(s).

i) Pursuant to 40 CFR 60.13(c), the owner or operator of an emissions unit shall conduct a performance evaluation of the continuous monitoring system during any performance test or within 30 days thereafter, in accordance with the applicable performance specification in 40 CFR 60 Appendix B, for nitrogen oxides or carbon monoxide. Performance evaluations of CEM systems shall be conducted at other times as required.

j) Pursuant to 40 CFR 60.13(d)(1), the owner(s) and operator(s) of all continuous monitoring systems shall perform appropriate calibration checks and zero and span adjustments in accordance with a written procedure at least once daily, in accordance with requirements specified in 40 CFR 60.13(d)(1).

k) Pursuant to 40 CFR 60.13(e), except for system breakdowns, repairs, calibration checks, and zero and span adjustments required under 40 CFR 60.13(d), all continuous monitoring systems shall be in continuous operation and shall meet minimum frequency of operation requirements which involves one cycle of operation (sampling, analyzing, and data recording) for each successive fifteen (15) minute period.

l) Pursuant to 40 CFR 60.13(f), all continuous monitoring systems or monitoring devices shall be installed such that representative measurements of emissions or process parameters from the emissions unit are obtained. Additional procedures for location of continuous monitoring systems contained in the applicable Performance Specifications of 40 CFR 60 Appendix B shall be used.

m) Pursuant to 40 CFR 60.13(h), for the continuous monitoring systems the owner(s) or operator(s) shall reduce all data to one-hour averages. The one-hour averages shall be computed from four or more data points equally spaced over each one-hour period. Data recorded during periods of continuous monitoring system breakdowns, repairs, calibration checks, and zero and span adjustments shall not be included in the data averages computed. An arithmetic or integrated average of all data may be used. The data may be recorded in reduced or nonreduced form (e.g., ppm pollutant and percent oxygen). All excess emissions shall be converted into units of the applicable standard using the applicable conversion procedures specified in Subpart GG. After conversion into units of the standard, the data may be rounded to the same number of significant digits as used to specify the applicable emission standard.

n) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), for the particulate/particulate-10 periodic monitoring the permittee shall monitor and ensure the sole firing of natural gas in the turbine.



## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

**4. Specific Monitoring Requirements continued:**

o) The permittee shall monitor the hours of operation on a weekly basis.

**5. Specific Record Keeping Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the gas turbine shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems and devices; and all other information required by Regulation 401 KAR 59:005 recorded in a permanent form suitable for inspection.

b) Records, including those documenting the results of each compliance test and all other records and reports required by this permit, shall be maintained for five (5) years pursuant to Regulation 401 KAR 50:035.

c) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the unit shall maintain the records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the emissions unit, any malfunction of the air pollution control equipment; or any period during which a continuous monitoring system or monitoring device is inoperative.

d) Records of the weekly natural gas (million standard cubic feet) combusted shall be maintained. Records shall be maintained to show that natural gas is the sole fuel burned in the turbine.

e) The permittee shall maintain a weekly log of all hours of operation of the turbine, for any consecutive twelve (12) month period.

f) The permittee shall maintain a weekly log of all sulfur content measurements or as otherwise required in an approved custom fuel sulfur monitoring plan for the gaseous fuel.

**6. Specific Reporting Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, minimum data requirements which follow shall be maintained and furnished in the format specified by the Division. Owners or operators of facilities required to install continuous monitoring systems shall submit for every calendar quarter a written report of excess emissions (as defined in applicable sections) to the Division. All quarterly reports shall be postmarked by the thirtieth (30th) day following the end of each calendar quarter and shall include the following information:

1) The magnitude of the excess emissions computed in accordance with the Regulation 401 KAR 59:005, Section 4(8), any conversion factors used, and the date and time of commencement and completion of each time period of excess emissions.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

a) continued

2) Specific identification of each period of excess emissions that occurs during startups, shutdowns, and malfunctions of the emissions unit. The nature and cause of any malfunction (if known), the corrective action taken or preventive measures adopted.

3) The date and time identifying each period during which continuous monitoring system was inoperative except for zero and span checks and the nature of the system repairs or adjustments.

4) When no excess emissions have occurred or the continuous monitoring system(s) have not been inoperative, repaired, or adjusted, such information shall be stated in the report.

b) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334 (c), for the reports regarding nitrogen oxides excess emissions, in lieu of those based on the water to fuel ratio monitoring, periods of excess emissions are defined as follows:

Nitrogen oxides: any three-hour period during which the average nitrogen oxides emission level as measured by the continuous monitoring system, falls above the emission limitation specified in Subsection 2, with which the permittee demonstrates compliance by the performance test required in 40 CFR 60.8.

c) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), each report of nitrogen oxides excess emissions shall include the average nitrogen oxides emission level in lieu of water to fuel ratio, average fuel consumption, ambient conditions, gas turbine load, and the graphs or figures developed.

d) Pursuant to 401 KAR 50:035 Section 7(1)(c), monitoring requirement with CEM for nitrogen oxides, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average) exceed the applicable nitrogen oxides emission standard. These periods of excess emissions shall be reported quarterly.

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), excess emissions of sulfur dioxide are defined as any daily period (or as otherwise required in an approved custom fuel sulfur monitoring plan) during which the sulfur content of the fuel being fired in the gas turbine(s) exceeds the limitations set forth in Subsection 2, Emission Limitations. These periods of excess emissions shall be reported quarterly.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

f) Pursuant to 401 KAR 50:035, Section 7(1)(c), monitoring requirement with CEM for carbon monoxide, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average of three contiguous one hour periods) exceed the applicable carbon monoxide emission standard. These periods of excess emissions shall be reported quarterly.

### **7. Specific Control Equipment Operating Conditions:**

a) The water injection control measure for nitrogen oxides emissions shall be used/operated as necessary to maintain compliance with permitted emission limitations, in accordance with manufacturer's specifications and/or standard operating practices. The permittee shall implement good combustion control and use low sulfur/low ash natural gas as fuel.

b) See Section E for further requirements.

## **SECTION B -EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

**Emissions Unit: 02 (02) - Natural Gas-Fired Simple Cycle Combustion Turbine**

### **Description:**

Construction commenced: expected September 1999

1734 MMBTU/hr (ISO standard day conditions, LHV) rated heat input capacity, 181 MW rated capacity output

Westinghouse 501FD gas-fired simple cycle combustion turbine equipped with water injection

### **Applicable Regulations:**

Regulation 401 KAR 60:330, Standards of performance for stationary gas turbines, incorporating by reference 40 CFR 60, Subpart GG, Standards of Performance for Stationary Gas Turbines, for emissions unit with a heat input at peak load equal to or greater than 10 MMBTU/hour for which construction commenced after October 3, 1977, and

Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality

### **1. Operating Limitations:**

1. The rated heat input capacity shall not exceed 1734 MMBTU/hour at ISO standard day conditions, in accordance with Regulation 401 KAR 51:017. The rated heat input capacity shall be calculated from the fuel usage, and corresponding fuel heating value characteristic of the fuel to be combusted corrected to ISO standard conditions based on manufacturer's curves or equations for correction.

2. The maximum annual hours of operation for the turbine shall not exceed 3500 hours. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

3. Natural gas shall be the sole fuel fired in the turbine. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

### **2. Emission Limitations: [See Section D for sourcewide emission limitations]**

a) The following table is a summary of the Best Available Control Technology (BACT) determination and is followed by applicable specific conditions. Values for nitrogen oxides and carbon monoxide are corrected to 15 % oxygen on a dry basis.

## SECTION B -EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS

### 2. Emission Limitations continued:

a) Continued

Fuel Specification	NO <sub>x</sub> (15 % O <sub>2</sub> )	CO (15 % O <sub>2</sub> )	SO <sub>2</sub>	PM/PM <sub>10</sub>	Technology
Natural gas	0.1 lb/MMBTU  (Equivalent to 25 ppmvd)	30 ppmvd (at rated capacity output) 90 ppmvd max (under other operating load conditions)	2.0 grains/ 100 SCF	19 lbs/hour	Water injection, Good combustion, Low sulfur fuel/clean fuel natural gas

b) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.332, and 401 KAR 51:017, nitrogen oxides emission level in the exhaust gas shall not exceed 0.1 lb/MMBTU based on 25 ppm by volume at 15 percent oxygen and on a dry basis, and based on a three-hour rolling average. The ppm level of nitrogen oxides (at ISO standard conditions) and lb/MMBTU shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

c) Pursuant to Regulation 401 KAR 51:017, the carbon monoxide emission level in the exhaust gas shall not exceed (i) at rated capacity output, a limit of 30 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period, or (ii) under other operating load conditions, a limit of 90 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period. During any three-hour period in which the unit is operated at both rated capacity output and less than rated capacity output, the carbon monoxide emission limit shall be based on the time-weighted average of 30 ppmvd and 90 ppmvd. The ppm level of carbon monoxide shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

d) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.333, and 401 KAR 51:017, the fuel sulfur content due to the firing of pipeline quality natural gas shall not exceed 2.0 grains sulfur/100 SCF gas.

e) Pursuant to Regulation 401 KAR 51:017, particulate emissions shall not exceed 19 pounds per hour.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **3. Testing Requirements:**

a) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335 (b), in conducting performance tests required by 40 CFR 60.8, the owner or operator shall use as test methods and procedures the test methods in Appendix A of Part 60 or other methods or procedures as specified in 40 CFR 60.335, except as provided for in 40 CFR 60.8(b).

b) The owner or operator shall determine compliance with the nitrogen oxides standard in accordance with 40 CFR 60.335(c)(1), (2), and (3) which includes use of Method 20 to determine the nitrogen oxides and oxygen concentrations.

c) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for nitrogen oxides. The initial nitrogen oxides performance test shall be performed in accordance with General Condition G(d)(5).

d) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial test for fuel sulfur content in accordance with General Condition G(d)(5).

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335(d), the owner or operator shall determine compliance with the sulfur content standard as follows: ASTM D 1072-80, D 3031-81, D 4084-82, or D 3246-81 shall be used for the sulfur content of gaseous fuels. The applicable ranges of some ASTM methods mentioned above are not adequate to measure the levels of sulfur in some fuel gases. Therefore, dilution of samples before analysis (with verification of the dilution ratio) may be used, subject to the approval of the Division.

f) To meet the requirements of 40 CFR 60.334(b), the owner or operator shall use the methods specified in 40 CFR 60.335(d) to determine the sulfur content of the fuel being burned. The analysis may be performed by the owner or operator, a service contractor retained by the owner or operator, the fuel vendor, or any other qualified agency.

g) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for carbon monoxide, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

h) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for particulate matter, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

i) See General Condition G(d)(6).

**SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS****4. Specific Monitoring Requirements:**

- a) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), and 40 CFR 75, the permittee shall install, calibrate, maintain, and operate the nitrogen oxides Continuous Emissions Monitor (CEM). The nitrogen oxides CEM shall be used as the indicator of continuous compliance with the nitrogen oxides emission standard. Excluding the startup and shut down periods, if any 3-hour rolling average exceeds the nitrogen oxides emission limitation, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary control device/process/CEM repairs or take corrective action as soon as practicable.
- b) The nitrogen oxides CEM shall be used in lieu of the water to fuel monitoring system for reporting excess emissions in accordance with 40 CFR 60.334(c)(1). The calibration of the water to fuel monitoring device required in 40 CFR 60.335(c)(2) will be replaced by the 40 CFR 75 certification tests of the nitrogen oxides CEM. The CEM emission rates for nitrogen oxides shall be corrected to ISO conditions to demonstrate compliance with the nitrogen oxides standard established in Subsection 2.
- c) Additionally, a CEM system shall be installed, calibrated, maintained, and operated for measuring oxygen levels.
- d) The owner or operator shall comply with all of the monitoring requirements of 40 CFR 75.
- e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(a), the owner or operator using water injection to control nitrogen oxide emissions shall install and operate a continuous monitoring system to monitor and record the fuel consumption. This system shall be accurate to within plus or minus five (5) percent and shall be approved by the Division.
- f) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(b), the owner or operator of any stationary turbine shall monitor sulfur content of the fuel being fired in the turbine. The frequency of determination of these values shall be as specified in 40 CFR 60.334(b)(1) and (2). (Custom fuel monitoring schedule required)
- g) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), to meet the periodic monitoring requirement for carbon monoxide the permittee shall use a continuous emission monitor (CEM). Excluding the startup and shut down periods, if any 3-hour rolling average carbon monoxide value exceeds the standard, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary process or CEM repairs or take corrective action as soon as practicable.

**SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS****4. Specific Monitoring Requirements continued:**

h) Pursuant to 40 CFR 60.13(b), the continuous monitoring systems and monitoring devices shall be installed and operational prior to conducting the initial performance tests. Verification of operational status shall, as a minimum, include completion of the manufacturer's written requirements or recommendations for installation, operation, and calibration of the device(s).

i) Pursuant to 40 CFR 60.13(c), the owner or operator of an emissions unit shall conduct a performance evaluation of the continuous monitoring system during any performance test or within 30 days thereafter, in accordance with the applicable performance specification in 40 CFR 60 Appendix B, for nitrogen oxides or carbon monoxide. Performance evaluations of CEM systems shall be conducted at other times as required.

j) Pursuant to 40 CFR 60.13(d)(1), the owner(s) and operator(s) of all continuous monitoring systems shall perform appropriate calibration checks and zero and span adjustments in accordance with a written procedure at least once daily, in accordance with requirements specified in 40 CFR 60.13(d)(1).

k) Pursuant to 40 CFR 60.13(e), except for system breakdowns, repairs, calibration checks, and zero and span adjustments required under 40 CFR 60.13(d), all continuous monitoring systems shall be in continuous operation and shall meet minimum frequency of operation requirements which involves one cycle of operation (sampling, analyzing, and data recording) for each successive fifteen (15) minute period.

l) Pursuant to 40 CFR 60.13(f), all continuous monitoring systems or monitoring devices shall be installed such that representative measurements of emissions or process parameters from the emissions unit are obtained. Additional procedures for location of continuous monitoring systems contained in the applicable Performance Specifications of 40 CFR 60 Appendix B shall be used.

m) Pursuant to 40 CFR 60.13(h), for the continuous monitoring systems the owner(s) or operator(s) shall reduce all data to one-hour averages. The one-hour averages shall be computed from four or more data points equally spaced over each one-hour period. Data recorded during periods of continuous monitoring system breakdowns, repairs, calibration checks, and zero and span adjustments shall not be included in the data averages computed. An arithmetic or integrated average of all data may be used. The data may be recorded in reduced or nonreduced form (e.g., ppm pollutant and percent oxygen). All excess emissions shall be converted into units of the applicable standard using the applicable conversion procedures specified in Subpart GG. After conversion into units of the standard, the data may be rounded to the same number of significant digits as used to specify the applicable emission standard.

n) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), for the particulate/particulate-10 periodic monitoring the permittee shall monitor and ensure the sole firing of natural gas in the turbine.



## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **4. Specific Monitoring Requirements continued:**

o) The permittee shall monitor the hours of operation on a weekly basis.

### **5. Specific Record Keeping Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the gas turbine shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems and devices; and all other information required by Regulation 401 KAR 59:005 recorded in a permanent form suitable for inspection.

b) Records, including those documenting the results of each compliance test and all other records and reports required by this permit, shall be maintained for five (5) years pursuant to Regulation 401 KAR 50:035.

c) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the unit shall maintain the records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the emissions unit, any malfunction of the air pollution control equipment; or any period during which a continuous monitoring system or monitoring device is inoperative.

d) Records of the weekly natural gas (million standard cubic feet) combusted shall be maintained. Records shall be maintained to show that natural gas is the sole fuel burned in the turbine.

e) The permittee shall maintain a weekly log of all hours of operation of the turbine, for any consecutive twelve (12) month period.

f) The permittee shall maintain a weekly log of all sulfur content measurements or as otherwise required in an approved custom fuel sulfur monitoring plan for the gaseous fuel.

### **6. Specific Reporting Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, minimum data requirements which follow shall be maintained and furnished in the format specified by the Division. Owners or operators of facilities required to install continuous monitoring systems shall submit for every calendar quarter a written report of excess emissions (as defined in applicable sections) to the Division. All quarterly reports shall be postmarked by the thirtieth (30th) day following the end of each calendar quarter and shall include the following information:

1) The magnitude of the excess emissions computed in accordance with the Regulation 401 KAR 59:005, Section 4(8), any conversion factors used, and the date and time of commencement and completion of each time period of excess emissions.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

a) continued

2) Specific identification of each period of excess emissions that occurs during startups, shutdowns, and malfunctions of the emissions unit. The nature and cause of any malfunction (if known), the corrective action taken or preventive measures adopted.

3) The date and time identifying each period during which continuous monitoring system was inoperative except for zero and span checks and the nature of the system repairs or adjustments.

4) When no excess emissions have occurred or the continuous monitoring system(s) have not been inoperative, repaired, or adjusted, such information shall be stated in the report.

b) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334 (c), for the reports regarding nitrogen oxides excess emissions, in lieu of those based on the water to fuel ratio monitoring, periods of excess emissions are defined as follows:

Nitrogen oxides: any three-hour period during which the average nitrogen oxides emission level as measured by the continuous monitoring system, falls above the emission limitation specified in Subsection 2, with which the permittee demonstrates compliance by the performance test required in 40 CFR 60.8.

c) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), each report of nitrogen oxides excess emissions shall include the average nitrogen oxides emission level in lieu of water to fuel ratio, average fuel consumption, ambient conditions, gas turbine load, and the graphs or figures developed.

d) Pursuant to 401 KAR 50:035 Section 7(1)(c), monitoring requirement with CEM for nitrogen oxides, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average) exceed the applicable nitrogen oxides emission standard. These periods of excess emissions shall be reported quarterly.

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), excess emissions of sulfur dioxide are defined as any daily period (or as otherwise required in an approved custom fuel sulfur monitoring plan) during which the sulfur content of the fuel being fired in the gas turbine(s) exceeds the limitations set forth in Subsection 2, Emission Limitations. These periods of excess emissions shall be reported quarterly.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

f) Pursuant to 401 KAR 50:035, Section 7(1)(c), monitoring requirement with CEM for carbon monoxide, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average of three contiguous one hour periods) exceed the applicable carbon monoxide emission standard. These periods of excess emissions shall be reported quarterly.

### **7. Specific Control Equipment Operating Conditions:**

a) The water injection control measure for nitrogen oxides emissions shall be used/operated as necessary to maintain compliance with permitted emission limitations, in accordance with manufacturer's specifications and/or standard operating practices. The permittee shall implement good combustion control and use low sulfur/low ash natural gas as fuel.

b) See Section E for further requirements.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

**Emissions Unit: 03 (03) - Natural Gas-Fired Simple Cycle Combustion Turbine**

### **Description:**

Construction commenced: expected September 1999

1734 MMBTU/hr (ISO standard day conditions, LHV) rated heat input capacity, 181 MW rated capacity output

Westinghouse 501FD gas-fired simple cycle combustion turbine equipped with water injection

### **Applicable Regulations:**

Regulation 401 KAR 60:330, Standards of performance for stationary gas turbines, incorporating by reference 40 CFR 60, Subpart GG, Standards of Performance for Stationary Gas Turbines, for emissions unit with a heat input at peak load equal to or greater than 10 MMBTU/hour for which construction commenced after October 3, 1977, and

Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality

### **1. Operating Limitations:**

1. The rated heat input capacity shall not exceed 1734 MMBTU/hour at ISO standard day conditions, in accordance with Regulation 401 KAR 51:017. The rated heat input capacity shall be calculated from the fuel usage, and corresponding fuel heating value characteristic of the fuel to be combusted corrected to ISO standard conditions based on manufacturer's curves or equations for correction.

2. The maximum annual hours of operation for the turbine shall not exceed 3500 hours. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

3. Natural gas shall be the sole fuel fired in the turbine. [Self-imposed restriction pursuant to Regulation 401 KAR 51:017].

### **2. Emission Limitations: [See Section D for sourcewide emission limitations]**

a) The following table is a summary of the Best Available Control Technology (BACT) determination and is followed by applicable specific conditions. Values for nitrogen oxides and carbon monoxide are corrected to 15 % oxygen on a dry basis.

## SECTION B -EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS

### 2. Emission Limitations continued:

a) Continued

Fuel Specification	NO <sub>x</sub> (15 % O <sub>2</sub> )	CO (15 % O <sub>2</sub> )	SO <sub>2</sub>	PM/PM <sub>10</sub>	Technology
Natural gas	0.1 lb/MMBTU  (Equivalent to 25 ppmvd)	30 ppmvd (at rated capacity output) 90 ppmvd max (under other operating load conditions)	2.0 grains/ 100 SCF	19 lbs/hour	Water injection, Good combustion, Low sulfur fuel/clean fuel natural gas

b) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.332, and 401 KAR 51:017, nitrogen oxides emission level in the exhaust gas shall not exceed 0.1 lb/MMBTU based on 25 ppm by volume at 15 percent oxygen and on a dry basis, and based on a three-hour rolling average. The ppm level of nitrogen oxides (at ISO standard conditions) and lb/MMBTU shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

c) Pursuant to Regulation 401 KAR 51:017, the carbon monoxide emission level in the exhaust gas shall not exceed (i) at rated capacity output, a limit of 30 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period, or (ii) under other operating load conditions, a limit of 90 ppm by volume at 15 % oxygen, on a dry basis, during any rolling three-hour average period. During any three-hour period in which the unit is operated at both rated capacity output and less than rated capacity output, the carbon monoxide emission limit shall be based on the time-weighted average of 30 ppmvd and 90 ppmvd. The ppm level of carbon monoxide shall be demonstrated by stack test, and measured with use of a continuous emission monitor (CEM).

d) Pursuant to Regulations 401 KAR 60:330 incorporating 40 CFR 60.333, and 401 KAR 51:017, the fuel sulfur content due to the firing of pipeline quality natural gas shall not exceed 2.0 grains sulfur/100 SCF gas.

e) Pursuant to Regulation 401 KAR 51:017, particulate emissions shall not exceed 19 pounds per hour.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **3. Testing Requirements:**

a) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335 (b), in conducting performance tests required by 40 CFR 60.8, the owner or operator shall use as test methods and procedures the test methods in Appendix A of Part 60 or other methods or procedures as specified in 40 CFR 60.335, except as provided for in 40 CFR 60.8(b).

b) The owner or operator shall determine compliance with the nitrogen oxides standard in accordance with 40 CFR 60.335(c)(1), (2), and (3) which includes use of Method 20 to determine the nitrogen oxides and oxygen concentrations.

c) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for nitrogen oxides. The initial nitrogen oxides performance test shall be performed in accordance with General Condition G(d)(5).

d) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial test for fuel sulfur content in accordance with General Condition G(d)(5).

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.335(d), the owner or operator shall determine compliance with the sulfur content standard as follows: ASTM D 1072-80, D 3031-81, D 4084-82, or D 3246-81 shall be used for the sulfur content of gaseous fuels. The applicable ranges of some ASTM methods mentioned above are not adequate to measure the levels of sulfur in some fuel gases. Therefore, dilution of samples before analysis (with verification of the dilution ratio) may be used, subject to the approval of the Division.

f) To meet the requirements of 40 CFR 60.334(b), the owner or operator shall use the methods specified in 40 CFR 60.335(a) and (d) to determine the sulfur content of the fuel being burned. The analysis may be performed by the owner or operator, a service contractor retained by the owner or operator, the fuel vendor, or any other qualified agency.

g) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for carbon monoxide, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

h) Pursuant to Regulation 401 KAR 50:045, the owner or operator shall conduct an initial performance test for particulate matter, with use of a reference test method approved by the Division, in accordance with General Condition G(d)(5).

i) See General Condition G(d)(6).

**SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS****4. Specific Monitoring Requirements:**

- a) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), and 40 CFR 75, the permittee shall install, calibrate, maintain, and operate the nitrogen oxides Continuous Emissions Monitor (CEM). The nitrogen oxides CEM shall be used as the indicator of continuous compliance with the nitrogen oxides emission standard. Excluding the startup and shut down periods, if any 3-hour rolling average exceeds the nitrogen oxides emission limitation, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary control device/process/CEM repairs or take corrective action as soon as practicable.
- b) The nitrogen oxides CEM shall be used in lieu of the water to fuel monitoring system for reporting excess emissions in accordance with 40 CFR 60.334(c)(1). The calibration of the water to fuel monitoring device required in 40 CFR 60.335(c)(2) will be replaced by the 40 CFR 75 certification tests of the nitrogen oxides CEM. The CEM emission rates for nitrogen oxides shall be corrected to ISO conditions to demonstrate compliance with the nitrogen oxides standard established in Subsection 2.
- c) Additionally, a CEM system shall be installed, calibrated, maintained, and operated for measuring oxygen levels.
- d) The owner or operator shall comply with all of the monitoring requirements of 40 CFR 75.
- e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(a), the owner or operator using water injection to control nitrogen oxide emissions shall install and operate a continuous monitoring system to monitor and record the fuel consumption. This system shall be accurate to within plus or minus five (5) percent and shall be approved by the Division.
- f) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(b), the owner or operator of any stationary turbine shall monitor sulfur content of the fuel being fired in the turbine. The frequency of determination of these values shall be as specified in 40 CFR 60.334(b)(1) and (2). (Custom fuel monitoring schedule required)
- g) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), to meet the periodic monitoring requirement for carbon monoxide the permittee shall use a continuous emission monitor (CEM). Excluding the startup and shut down periods, if any 3-hour rolling average carbon monoxide value exceeds the standard, the permittee shall, as appropriate, initiate an investigation of the cause of the exceedance and complete necessary process or CEM repairs or take corrective action as soon as practicable.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **4. Specific Monitoring Requirements continued:**

h) Pursuant to 40 CFR 60.13(b), the continuous monitoring systems and monitoring devices shall be installed and operational prior to conducting the initial performance tests. Verification of operational status shall, as a minimum, include completion of the manufacturer's written requirements or recommendations for installation, operation, and calibration of the device(s).

i) Pursuant to 40 CFR 60.13(c), the owner or operator of an emissions unit shall conduct a performance evaluation of the continuous monitoring system during any performance test or within 30 days thereafter, in accordance with the applicable performance specification in 40 CFR 60 Appendix B, for nitrogen oxides or carbon monoxide. Performance evaluations of CEM systems shall be conducted at other times as required.

j) Pursuant to 40 CFR 60.13(d)(1), the owner(s) and operator(s) of all continuous monitoring systems shall perform appropriate calibration checks and zero and span adjustments in accordance with a written procedure at least once daily, in accordance with requirements specified in 40 CFR 60.13(d)(1).

k) Pursuant to 40 CFR 60.13(e), except for system breakdowns, repairs, calibration checks, and zero and span adjustments required under 40 CFR 60.13(d), all continuous monitoring systems shall be in continuous operation and shall meet minimum frequency of operation requirements which involves one cycle of operation (sampling, analyzing, and data recording) for each successive fifteen (15) minute period.

l) Pursuant to 40 CFR 60.13(f), all continuous monitoring systems or monitoring devices shall be installed such that representative measurements of emissions or process parameters from the emissions unit are obtained. Additional procedures for location of continuous monitoring systems contained in the applicable Performance Specifications of 40 CFR 60 Appendix B shall be used.

m) Pursuant to 40 CFR 60.13(h), for the continuous monitoring systems the owner(s) or operator(s) shall reduce all data to one-hour averages. The one-hour averages shall be computed from four or more data points equally spaced over each one-hour period. Data recorded during periods of continuous monitoring system breakdowns, repairs, calibration checks, and zero and span adjustments shall not be included in the data averages computed. An arithmetic or integrated average of all data may be used. The data may be recorded in reduced or nonreduced form (e.g., ppm pollutant and percent oxygen). All excess emissions shall be converted into units of the applicable standard using the applicable conversion procedures specified in Subpart GG. After conversion into units of the standard, the data may be rounded to the same number of significant digits as used to specify the applicable emission standard.

n) Pursuant to Regulation 401 KAR 50:035, Section 7(1)(c), for the particulate/particulate-10 periodic monitoring the permittee shall monitor and ensure the sole firing of natural gas in the turbine.



## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **4. Specific Monitoring Requirements continued:**

o) The permittee shall monitor the hours of operation on a weekly basis.

### **5. Specific Record Keeping Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the gas turbine shall maintain a file of all measurements, including continuous monitoring system, monitoring device, and performance testing measurements; all continuous monitoring system performance evaluations; all continuous monitoring system or monitoring device calibration checks; adjustments and maintenance performed on these systems and devices; and all other information required by Regulation 401 KAR 59:005 recorded in a permanent form suitable for inspection.

b) Records, including those documenting the results of each compliance test and all other records and reports required by this permit, shall be maintained for five (5) years pursuant to Regulation 401 KAR 50:035.

c) Pursuant to Regulation 401 KAR 59:005, Section 3, the owner or operator of the unit shall maintain the records of the occurrence and duration of any startup, shutdown, or malfunction in the operation of the emissions unit, any malfunction of the air pollution control equipment; or any period during which a continuous monitoring system or monitoring device is inoperative.

d) Records of the weekly natural gas (million standard cubic feet) combusted shall be maintained. Records shall be maintained to show that natural gas is the sole fuel burned in the turbine.

e) The permittee shall maintain a weekly log of all hours of operation of the turbine, for any consecutive twelve (12) month period.

f) The permittee shall maintain a weekly log of all sulfur content measurements or as otherwise required in an approved custom fuel sulfur monitoring plan for the gaseous fuel.

### **6. Specific Reporting Requirements:**

a) Pursuant to Regulation 401 KAR 59:005, Section 3, minimum data requirements which follow shall be maintained and furnished in the format specified by the Division. Owners or operators of facilities required to install continuous monitoring systems shall submit for every calendar quarter a written report of excess emissions (as defined in applicable sections) to the Division. All quarterly reports shall be postmarked by the thirtieth (30th) day following the end of each calendar quarter and shall include the following information:

1) The magnitude of the excess emissions computed in accordance with the Regulation 401 KAR 59:005, Section 4(8), any conversion factors used, and the date and time of commencement and completion of each time period of excess emissions.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

#### **a) continued**

2) Specific identification of each period of excess emissions that occurs during startups, shutdowns, and malfunctions of the emissions unit. The nature and cause of any malfunction (if known), the corrective action taken or preventive measures adopted.

3) The date and time identifying each period during which continuous monitoring system was inoperative except for zero and span checks and the nature of the system repairs or adjustments.

4) When no excess emissions have occurred or the continuous monitoring system(s) have not been inoperative, repaired, or adjusted, such information shall be stated in the report.

b) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334 (c), for the reports regarding nitrogen oxides excess emissions, in lieu of those based on the water to fuel ratio monitoring, periods of excess emissions are defined as follows:

Nitrogen oxides: any three-hour period during which the average nitrogen oxides emission level as measured by the continuous monitoring system, falls above the emission limitation specified in Subsection 2, with which the permittee demonstrates compliance by the performance test required in 40 CFR 60.8.

c) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), each report of nitrogen oxides excess emissions shall include the average nitrogen oxides emission level in lieu of water to fuel ratio, average fuel consumption, ambient conditions, gas turbine load, and the graphs or figures developed.

d) Pursuant to 401 KAR 50:035 Section 7(1)(c), monitoring requirement with CEM for nitrogen oxides, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average) exceed the applicable nitrogen oxides emission standard. These periods of excess emissions shall be reported quarterly.

e) Pursuant to Regulation 401 KAR 60:330, incorporating 40 CFR 60.334(c), excess emissions of sulfur dioxide are defined as any daily period (or as otherwise required in an approved custom fuel sulfur monitoring plan) during which the sulfur content of the fuel being fired in the gas turbine(s) exceeds the limitations set forth in Subsection 2, Emission Limitations. These periods of excess emissions shall be reported quarterly.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **6. Specific Reporting Requirements continued:**

f) Pursuant to 401 KAR 50:035, Section 7(1)(c), monitoring requirement with CEM for carbon monoxide, excess emissions are defined as any three (3) hour period during which the average emissions (arithmetic average of three contiguous one hour periods) exceed the applicable carbon monoxide emission standard. These periods of excess emissions shall be reported quarterly.

### **7. Specific Control Equipment Operating Conditions:**

a) The water injection control measure for nitrogen oxides emissions shall be used/operated as necessary to maintain compliance with permitted emission limitations, in accordance with manufacturer's specifications and/or standard operating practices. The permittee shall implement good combustion control and use low sulfur/low ash natural gas as fuel.

b) See Section E for further requirements.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **Emissions Unit: 05 (--) - Emergency diesel fire-water pump/engine**

#### **Description:**

Construction commenced: expected September 1999

500 horsepower diesel fueled reciprocating engine

30 gallons of diesel fuel use per hour

#### **Applicable Regulations:**

Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality

#### **1. Operating Limitations:**

Pursuant to Regulation 401 KAR 51:017, the permittee shall limit the operation of the emergency diesel pump to 30 minutes in any given hour once a week except during emergency situations. This limitation is required to ensure the air quality impact is below the significant impact level and a full impact analysis will be required to increase this limit.

#### **2. Emission Limitations:**

1. Pursuant to Regulation 401 KAR 51:017, emissions of nitrogen oxides shall not exceed 6.6 lbs/hour.

2. Pursuant to Regulation 401 KAR 51:017, emissions of carbon monoxide shall not exceed 1.8 lbs/hour.

3. Pursuant to Regulation 401 KAR 51:017, emissions of sulfur dioxide shall not exceed 0.13 lbs/hour and the diesel fuel sulfur content shall not exceed 0.05 weight percent.

4. Pursuant to Regulation 401 KAR 51:017, emissions of particulate matter shall not exceed 1.1 lbs/hour.

#### **3. Testing Requirements:**

None

#### **4. Specific Monitoring Requirements:**

1. The permittee shall monitor the monthly fuel usage rate.

2. The permittee shall monitor the fuel sulfur content.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **5. Specific Recordkeeping Requirements:**

1. The permittee shall maintain records of monthly fuel used and hours of operation of the emergency diesel engine. The record shall be maintained on site and made available for inspection by authorized personnel from the Division.
2. The permittee shall maintain records of the diesel fuel sulfur content of each batch of fuel received for use in the emergency engine. The sulfur content shall be determined based on the fuel supplier certification.
3. The permittee shall calculate and maintain records of such calculations to assure compliance with the hourly emission limitations for the emergency diesel engine. The calculations shall be performed monthly with use of the monthly fuel usage, fuel sulfur content, monthly hours of operation, and emission factors as determined from Appendix B and Table 6-5 (July 12, 1999) of the application for the diesel engine.

### **6. Specific Reporting Requirements:**

None

### **7. Specific Operating Conditions:**

Pursuant to Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality, the permittee shall comply with best available control technology with use of good combustion control, good operating practices, and use of low sulfur/low ash diesel fuel.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **Emissions Unit: 07 (--) - Natural Gas Heater**

#### **Description:**

Construction commenced: expected September 1999

9 MMBTU/hour natural gas heater

#### **Applicable Regulations:**

Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality

#### **1. Operating Limitations:**

Pursuant to Regulation 401 KAR 51:017, the permittee shall limit the operation of the natural gas heater to 3500 hours/year.

#### **2. Emission Limitations:**

1. Pursuant to Regulation 401 KAR 51:017, emissions of nitrogen oxides shall not exceed 0.90 lbs/hour.

2. Pursuant to Regulation 401 KAR 51:017, emissions of carbon monoxide shall not exceed 0.45 lbs/hour.

3. Pursuant to Regulation 401 KAR 51:017, the fuel sulfur content due to the firing of pipeline quality natural gas shall not exceed 2.0 grains sulfur/100 SCF gas.

4. Pursuant to Regulation 401 KAR 51:017, emissions of particulate matter shall not exceed 0.09 lbs/hour.

#### **3. Testing Requirements:**

None

#### **4. Specific Monitoring Requirements:**

The permittee shall monitor the monthly fuel usage, the average monthly fuel heat content, and the monthly hours of operation.

## **SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**

### **5. Specific Recordkeeping Requirements:**

1. The permittee shall maintain records of monthly fuel used, monthly average fuel heat content, and monthly hours of operation of the natural gas heater. The record shall be maintained on site and made available for inspection by authorized personnel from the Division.

2. The permittee shall calculate and maintain records of such calculations to assure compliance with the hourly emission limitations for the natural gas heater. The calculations shall be performed monthly with use of the monthly fuel usage, fuel heat content, hours of operation, and emission factors as specified in Appendix B of the application for the natural gas heater.

3. The permittee shall maintain monthly records of the natural gas fuel sulfur content.

### **6. Specific Reporting Requirements:**

None

### **7. Specific Operating Conditions:**

Pursuant to Regulation 401 KAR 51:017, Prevention of significant deterioration of air quality, the permittee shall comply with best available control technology with use of low nitrogen oxide technology, good combustion control, good operating practices, and use of low sulfur/low ash natural gas as fuel.

**SECTION C - INSIGNIFICANT ACTIVITIES**

NONE

DRAFT



## **SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS**

1. Particulate, nitrogen oxides, and carbon monoxide emissions, as measured by methods referenced in Regulation 401 KAR 50:015, Section 1, shall not exceed the respective limitations specified herein.
2. Compliance with any annual emissions, operating, or process limitations imposed pursuant to Regulation 401 KAR 50:035, Section 7(1)(a), and contained in this permit, shall be based on emissions and operation for any twelve (12) consecutive months.
3. Gas Combustion Turbines (emission units 01, 02, and 03):  
Pursuant to Regulation 401 KAR 51:017, potential emissions of nitrogen oxides from the combustion turbines, emission points 01 through 03, shall not exceed 700 tons per year, during any consecutive twelve (12) month period. The permittee may assure compliance with this limitation by use of continuous emission monitoring (CEMs). The permittee shall track and maintain a monthly total and summary of nitrogen oxides emissions to assure compliance with this limitation.
4. Gas Combustion Turbines (emission units 01, 02, and 03):  
Pursuant to Regulation 401 KAR 51:017, potential emissions of carbon monoxide from the combustion turbines, emission points 01 through 03, shall not exceed 800 tons per year during any consecutive twelve (12) month period. The permittee may assure compliance with this limitation by use of continuous emission monitoring (CEMs). The permittee shall track and maintain a monthly total and summary of carbon monoxide emissions to assure compliance with this limitation.

## **SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS**

1. Pursuant to Regulation 401 KAR 50:055, Section 2(5), at all times, including periods of startup, shutdown and malfunction, owners and operators shall, to the extent practicable, maintain and operate any emissions unit including associated air pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Division which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.

## **SECTION F - MONITORING, RECORD KEEPING, AND REPORTING REQUIREMENTS**

The following requirements become effective after commencement of operation:

1. When continuing compliance is demonstrated by periodic testing or instrumental monitoring, the permittee shall compile records of required monitoring information that include:
  - a. Date, place as defined in this permit, and time of sampling or measurements;
  - b. Analyses performance dates;
  - c. Company or entity that performed analyses;
  - d. Analytical techniques or methods used;
  - e. Analyses results; and
  - f. Operating conditions during time of sampling or measurement.
2. Records of all required monitoring data and support information, including calibrations, maintenance records, and original strip chart recordings, and copies of all reports required by the Division for Air Quality, shall be retained by the permittee for a period of five years and shall be made available for inspection upon request by any duly authorized representative of the Division for Air Quality. [401 KAR 50:035, Permits, Section 7(1)(d)2 and 401 KAR 50:035, Permits, Section 7(2)(c)]
3. In accordance with the requirements of Regulation 401 KAR 50:035, Permits, Section 7(2)(c) the permittee shall allow the Cabinet or authorized representatives to perform the following:
  - a. Enter upon the premises where a source is located or emissions-related activity is conducted, or where records are kept;
  - b. Have access to and copy, at reasonable times, any records required by the permit:
    - i. During normal office hours, and
    - ii. During periods of emergency when prompt access to records is essential to proper assessment by the Cabinet;
  - c. Inspect, at reasonable times, any facilities, equipment (including monitoring and pollution control equipment), practices, or operations required by the permit. Reasonable times shall include, but are not limited to the following:
    - i. During all hours of operation at the source,
    - ii. For all sources operated intermittently, during all hours of operation at the source and the hours between 8:00 a.m. and 4:30 p.m., Monday through Friday, excluding holidays, and
    - iii. During an emergency; and
  - d. Sample or monitor, at reasonable times, substances or parameters to assure compliance with the permit or any applicable requirements. Reasonable times shall include, but are not limited to the following:
    - i. During all hours of operation at the source,
    - ii. For all sources operated intermittently, during all hours of operation at the source and the hours between 8:00 a.m. and 4:30 p.m., Monday through Friday, excluding holidays, and
    - iii. During an emergency.

## **SECTION F - MONITORING, RECORD KEEPING, AND REPORTING REQUIREMENTS (CONTINUED)**

4. No person shall obstruct, hamper, or interfere with any Cabinet employee or authorized representative while in the process of carrying out official duties. Refusal of entry or access may constitute grounds for permit revocation and assessment of civil penalties.
5. Summary reports of any monitoring required by this permit shall be submitted to the Division's Paducah Regional Office at least every six (6) months during the life of this permit, unless otherwise stated in this permit. The reports are due within 30 days after the end of each six month reporting period which commences on the initial issuance date of this permit. The permittee may shift to semi-annual reporting on a calendar year basis upon approval of the regional office. If calendar year reporting is approved, the semi-annual reports are due January 30th and July 30th of each year. All reports shall be certified by a responsible official pursuant to Section 6(1) of Regulation 401 KAR 50:035, Permits. All deviations from permit requirements shall be clearly identified in the reports.
6.
  - a. In accordance with the provisions of Regulation 401 KAR 50:055, Section 1 the owner or operator shall notify the Division for Air Quality's Paducah Regional Office concerning startups, shutdowns, or malfunctions as follows:
    - i. When emissions during any planned shutdowns and ensuing startups will exceed the standards, notification shall be made no later than three (3) days before the planned shutdown, or immediately following the decision to shut down, if the shutdown is due to events which could not have been foreseen three (3) days before the shutdown.
    - ii. When emissions due to malfunctions, unplanned shutdowns and ensuing startups are or may be in excess of the standards, notification shall be made as promptly as possible by telephone (or other electronic media) and shall cause written notice upon request.
  - b. In accordance with the provisions of Regulation 401 KAR 50:035, Section 7(1)(e)2, the owner or operator shall promptly report deviations from permit requirements including those attributed to upset conditions to the Division for Air Quality's Paducah Regional Office. Prompt reporting shall be defined as quarterly for any deviation related to emission standards (other than emission exceedances covered by condition 6(a) above) and semi-annually for all other deviations from the permit requirements if not otherwise specified in the permit.

## **SECTION F - MONITORING, RECORD KEEPING, AND REPORTING REQUIREMENTS (CONTINUED)**

7. Pursuant to Regulation 401 KAR 50:035, Permits, Section 7(2)(b), the permittee shall certify compliance with the terms and conditions contained in this permit, annually on the permit issuance anniversary date or by January 30th of each year if calendar year reporting is approved by the regional office, by completing and returning a Compliance Certification Form (DEP 7007CC) (or an approved alternative) to the Division for Air Quality and the U.S. EPA in accordance with the following requirements:
- Identification of each term or condition of the permit that is the basis of the certification;
  - The compliance status regarding each term or condition of the permit;
  - Whether compliance was continuous or intermittent;
  - The method used for determining the compliance status for the source, currently and over the reporting period, pursuant to 401 KAR 50:035, Section 7(1)(c),(d), and (e); and
  - The certification shall be postmarked by the thirtieth (30) day following the applicable permit issuance anniversary date, or by January 30th of each year if calendar year reporting is approved by the regional office. Annual compliance certifications should be mailed to the following addresses:

Division for Air Quality  
Paducah Regional Office  
4500 Clarks River Road  
Paducah, KY 42003

U.S. EPA Region IV  
Air Enforcement Branch  
Atlanta Federal Center  
61 Forsyth St.  
Atlanta, GA 30303-8960

Division for Air Quality  
Central Files  
803 Schenkel Lane  
Frankfort, KY 40601.

8. In accordance with Regulation 401 KAR 50:035, Section 23, the permittee shall provide the Division with all information necessary to determine its subject emissions within thirty (30) days of the date the KYEIS emission report is mailed to the permittee.
9. Pursuant to Section VII.3 of the policy manual of the Division for Air Quality as referenced by Regulation 401 KAR 50:016, Section 1(1), results of performance test(s) required by the permit shall be submitted to the Division by the source or its representative within forty-five days after the completion of the fieldwork.

**SECTION G - GENERAL CONDITIONS****(a) General Compliance Requirements**

1. The permittee shall comply with all conditions of this permit. A noncompliance shall be (a) violation(s) of state regulation 401 KAR 50:035, Permits, Section 7(3)(d), and for federally enforceable permits is also a violation of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act), and is grounds for enforcement action including but not limited to the termination, revocation and reissuance, or revision of this permit.
2. The filing of a request by the permittee for any permit revision, revocation, reissuance, or termination, or of a notification of a planned change or anticipated noncompliance, shall not stay any permit condition.
3. This permit may be revised, revoked, reopened and reissued, or terminated for cause. The permit will be reopened for cause and revised accordingly under the following circumstances:
  - a. If additional applicable requirements become applicable to the source and the remaining permit term is three (3) years or longer. In this case, the reopening shall be completed no later than eighteen (18) months after promulgation of the applicable requirement. A reopening shall not be required if compliance with the applicable requirement is not required until after the date on which the permit is due to expire, unless this permit or any of its terms and conditions have been extended pursuant to Regulation 401 KAR 50:035, Section 12(2)(c);
  - b. The Cabinet or the U. S. EPA determines that the permit must be revised or revoked to assure compliance with the applicable requirements;
  - c. The Cabinet or the U. S. EPA determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit; or
  - d. If any additional applicable requirements of the Acid Rain Program become applicable to the source.

Proceedings to reopen and reissue a permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of the permit for which cause to reopen exists. Reopenings shall be made as expeditiously as practicable. Reopenings shall not be initiated before a notice of intent to reopen is provided to the source by the Division, at least thirty (30) days in advance of the date the permit is to be reopened, except that the Division may provide a shorter time period in the case of an emergency.

4. The permittee shall furnish to the Division, in writing, information that the Division may request to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit, or to determine compliance with the permit. [401 KAR 50:035, Permits, Section 7(2)(b)3e and 401 KAR 50:035, Permits, Section 7(3)(j)]
5. The permittee, upon becoming aware that any relevant facts were omitted or incorrect information was submitted in the permit application, shall promptly submit such supplementary facts or corrected information to the permitting authority.

**SECTION G - GENERAL CONDITIONS (CONTINUED)**

6. Any condition or portion of this permit which becomes suspended or is ruled invalid as a result of any legal or other action shall not invalidate any other portion or condition of this permit. [401 KAR 50:035, Permits, Section 7(3)(k)]
7. The permittee shall not use as a defense in an enforcement action the contention that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance. [401 KAR 50:035, Permits, Section 7(3)(e)]
8. Except as identified as state-origin requirements in this permit, all terms and conditions contained herein shall be enforceable by the United States Environmental Protection Agency and citizens of the United States.
9. This permit shall be subject to suspension if the permittee fails to pay all emissions fees within 90 days after the date of notice as specified in 401 KAR 50:038, Section 3(6). [401 KAR 50:035, Permits, Section 7(3)(h)]
10. Nothing in this permit shall alter or affect the liability of the permittee for any violation of applicable requirements prior to or at the time of permit issuance. [401 KAR 50:035, Permits, Section 8(3)(b)]
11. This permit shall not convey property rights or exclusive privileges. [401 KAR 50:035, Permits, Section 7 (3)(g)]
12. Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by the Kentucky Cabinet for Natural Resources and Environmental Protection or any other federal, state, or local agency.
13. Nothing in this permit shall alter or affect the authority of U.S. EPA to obtain information pursuant to Federal Statute 42 USC 7414, Inspections, monitoring, and entry. [401 KAR 50:035 , Permits, Section 7(2)(b)5]
14. Nothing in this permit shall alter or affect the authority of U.S. EPA to impose emergency orders pursuant to Federal Statute 42 USC 7603, Emergency orders. [401 KAR 50:035, Permits, Section 8(3)(a)]
15. Permit Shield: Except as provided in State Regulation 401 KAR 50:035, Permits, compliance by the emission units listed herein with the conditions of this permit shall be deemed to be compliance with all applicable requirements identified in this permit as of the date of issuance of this permit.
16. Fugitive emissions shall be controlled in accordance with Regulation 401 KAR 63:010.
17. Emission limitations listed in this permit shall apply at all times except during periods of startup, shutdown, or malfunctions in accordance with Regulation 401 KAR 50:055, provided the permittee complies with the requirements of Regulation 401 KAR 50:055.

**SECTION G - GENERAL CONDITIONS (CONTINUED)****(b) Permit Expiration and Reapplication Requirements**

This permit shall remain in effect for a fixed term of five (5) years following the original date of issue. Permit expiration shall terminate the source's right to operate unless a timely and complete renewal application has been submitted to the Division at least six months prior to the expiration date of the permit. Upon a timely and complete submittal, the authorization to operate within the terms and conditions of this permit, including any permit shield, shall remain in effect beyond the expiration date, until the renewal permit is issued or denied by the Division. [401 KAR 50:035, Permits, Section 12]

**(c) Permit Revisions**

1. A minor permit revision procedure may be used for permit revisions involving the use of economic incentive, marketable permit, emission trading, and other similar approaches, to the extent that these minor permit revision procedures are explicitly provided for in the State Implementation Plan (SIP) or in applicable requirements and meet the relevant requirements of Regulation 401 KAR 50:035, Section 15.
2. This permit is not transferable by the permittee. Future owners and operators shall obtain a new permit from the Division for Air Quality. The new permit may be processed as an administrative amendment if no other change in this permit is necessary, and provided that a written agreement containing a specific date for transfer of permit responsibility coverage and liability between the current and new permittee has been submitted to the permitting authority thirty (30) days in advance of the transfer.

**(d) Construction, Start-Up, and Initial Compliance Demonstration Requirements**

1. Construction of process and/or air pollution control equipment authorized by this permit shall be conducted and completed only in compliance with the conditions of this permit.
2. Within thirty (30) days following commencement of construction, and within fifteen (15) days following start-up, and attainment of the maximum production rate specified in the permit application, or within fifteen (15) days following the issuance date of this permit, whichever is later, the permittee shall furnish to the Division for Air Quality's Paducah Regional Office in writing, with a copy to the division's Frankfort Central Office, notification of the following:
  - a. The date when construction commenced.
  - b. The date of start-up of the emission units listed in this permit.
  - c. The date when the maximum production rate specified in the permit application was achieved.



**SECTION G - GENERAL CONDITIONS (CONTINUED)**

3. Pursuant to State Regulation 401 KAR 50:035, Permits, Section 13(1), unless construction is commenced on or before 18 months after the date of issue of this permit, or if construction is commenced and then stopped for any consecutive period of 18 months or more, or if construction is not completed within eighteen (18) months of the scheduled completion date, then the construction and operating authority granted by this permit for those emission units for which construction was not completed shall immediately become invalid. Extensions of the time periods specified herein may be granted by the Division upon a satisfactory request showing that an extension is justified.
  4. Operation of the emission units for which construction is authorized by this permit shall not commence until compliance with the applicable standards specified herein has been demonstrated pursuant to 401 KAR 50:055.
  5. This permit shall allow time for the initial start-up, operation, and compliance demonstration of the emission units listed herein. However, within sixty (60) days after achieving the maximum production rate at which the emission units will be operated but not later than 180 days after initial start-up of such facilities, the permittee shall conduct a performance demonstration (tests) at various loads on the emissions units for nitrogen oxides, carbon monoxide, sulfur dioxide, particulates, volatile organic compounds, and formaldehyde in accordance with Regulation 401 KAR 50:055, General compliance requirements. These performance tests must also be conducted in accordance with General Conditions G(d)6 of this permit and the permittee must furnish to the Division for Air Quality's Frankfort Central Office a written report of the results of such performance tests.
  6. Pursuant to Section VII 2.(1) of the policy manual of the Division for Air Quality as referenced by Regulation 401 KAR 50:016, Section 1.(1), at least one month prior to the date of the required performance test, the permittee shall complete and return a Compliance Test Protocol (Form DEP 6027) showing the proposed test conditions and number of tests, to the Division's Frankfort Central Office. Pursuant to 401 KAR 50:045, Section 5, the Division shall be notified of the actual test date at least ten (10) days prior to the test.
- (e) Acid Rain Program Requirements
1. If an applicable requirement of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act) is more stringent than an applicable requirement promulgated pursuant to Federal Statute 42 USC 7651 through 7651o (Title IV of the Act), both provisions shall apply, and both shall be state and federally enforceable.
  2. The permittee shall comply with all requirements and conditions of the Title IV Acid Rain Permit(s) issued for this source.

## SECTION G - GENERAL CONDITIONS (CONTINUED)

(f) Emergency Provisions

1. An emergency shall constitute an affirmative defense to an action brought for noncompliance with the technology-based emission limitations if the permittee demonstrates through properly signed contemporaneous operating logs or other relevant evidence that:
  - a. An emergency occurred and the permittee can identify the cause of the emergency;
  - b. The permitted facility was at the time being properly operated;
  - c. During an emergency, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements in the permit; and,
  - d. The permittee notified the Division as promptly as possible and submitted written notice of the emergency to the Division within two working days after the time when emission limitations were exceeded due to the emergency. The notice shall meet the requirements of 401 KAR 50:035, Permits, Section 7(1)(e), and include a description of the emergency, steps taken to mitigate emissions, and the corrective actions taken. This requirement does not relieve the source of any other local, state or federal notification requirements.
2. Emergency conditions listed in General Condition (f)1 above are in addition to any emergency or upset provision(s) contained in an applicable requirement.
3. In an enforcement proceeding, the permittee seeking to establish the occurrence of an emergency shall have the burden of proof. [401 KAR 50:035, Permits, Section 9(3)]

(g) Risk Management Provisions

1. The permittee shall comply with all applicable requirements of 40 CFR Part 68, Risk Management Plan provisions. If required, the permittee shall:
  - a. Submit a Risk Management Plan (RMP) and comply with the Risk Management Program. The permittee shall submit the RMP on diskette to:

RMP Reporting Center  
P.O. Box 3346  
Merrifield, VA 22116-3346.
  - b. Submit additional relevant information if requested by the Division or the U.S. EPA.

## SECTION G - GENERAL CONDITIONS (CONTINUED)

(h) Ozone depleting substances

1. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B:
  - a. Persons opening appliances for maintenance, service, repair, or disposal shall comply with the required practices contained in 40 CFR 82.156.
  - b. Equipment used during the maintenance, service, repair, or disposal of appliances shall comply with the standards for recycling and recovery equipment contained in 40 CFR 82.158.
  - c. Persons performing maintenance, service, repair, or disposal of appliances shall be certified by an approved technician certification program pursuant to 40 CFR 82.161.
  - d. Persons disposing of small appliances, MVACs, and MVAC-like appliances (as defined at 40 CFR 82.152) shall comply with the recordkeeping requirements pursuant to 40 CFR 82.166.
  - e. Persons owning commercial or industrial process refrigeration equipment shall comply with the leak repair requirements pursuant to 40 CFR 82.156.
  - f. Owners/operators of appliances normally containing 50 or more pounds of refrigerant shall keep records of refrigerant purchased and added to such appliances pursuant to 40 CFR 82.166.
2. If the permittee performs service on motor (fleet) vehicle air conditioners containing ozone-depleting substances, the source shall comply with all applicable requirements as specified in 40 CFR 82, Subpart B, Servicing of Motor Vehicle Air Conditioners.

## SECTION H - ALTERNATE OPERATING SCENARIOS

None

## SECTION I - COMPLIANCE SCHEDULE

None